California Bay-Delta Authority Committee
Drinking Water Subcommittee
Draft Minutes
Meeting of September 26, 2003

The Drinking Water Subcommittee met on September 26, 2003 at 9:00 am. Co-chair Greg Gartrell welcomed the group. Co-chair Marguerite Young arrived at the meeting shortly after it began. Greg asked if the group minded re-arranging the order of the agenda within the Updates and Reports segment to accommodate call-in presenters. No one objected. A list of meeting attendees from the voluntary sign-in sheet is at the end of this document.

Meeting Summary

Draft Minutes August 22, 2003

The Subcommittee reviewed and approved the minutes from the August 22nd meeting without additional comment.

Central Valley Drinking Water Policy Update

Elaine Archibald (CUWA) reminded the DWS of the draft Power Point presentation discussing the background, current framework, and general overview of the Central Valley Drinking Water Policy (CVDWP) given to the DWS at the August meeting. Revisions were made to that Power Point presentation based on DWS comments, and the presentation was given at a workshop on the issue held at the CVRWQCB on September 5th. Elaine informed the subcommittee that the presentation was well received, and that the Board members recognized the need for a more formal drinking water policy. Since it will not be possible to meet the ROD commitment for a policy by the end of 2004, the CVDWP Work Group is developing a draft resolution for adoption by the RWQCB. The goal of the resolution is to emphasize the importance of drinking water quality and the need for a policy. The CVDWP Work Group has developed a draft scope of work with U.S. EPA to contract with a consultant to develop conceptual models and perform a preliminary loading analysis. The proposal submitted to the SWRCB to conduct a number of tasks in the Work Plan has advanced to the next stage of the grant proposal. Elaine informed the group that Michael Stanley-Jones of Clean Water Action has joined the Work Group to provide additional outreach (over a 4-7 year process) to environmental justice stakeholders. The outreach effort may result in caucus of these types of interest groups. Elaine reported that Aaron Ferguson of NCWA has joined the work group as well to represent Sacramento Valley agricultural interests.

Eugenia Laychak asked about the relationship of the CVDWP and the Policy Framework of the Drinking Water Subcommittee that was recently recommended to the California Bay-Delta Authority. Elaine explained that the two efforts are similar but with different scopes: the framework only applies to addressing water quality impacts of CALFED projects whereas the CVDWP will provide the regulatory tool to protect water quality throughout the Central Valley. Tim Quinn added that the policies would be very similar because at this point, the RWQCB has no process regarding drinking water quality.

In response to a question regarding the inclusion of ELPH concepts in the Policy, Elaine answered that the CVDWP is focusing on one of the components of ELPH diagram, source protection.

CBDA and BDPAC Meeting Updates

Co-chair Greg Gartrell informed the subcommittee that the latest revised version of the DWS Policy Framework had been adopted by the BDPAC at their September 11th meeting. A copy of the approved Policy Framework was provided as part of the meeting materials that were e-mailed to members of the subcommittee. The BDPAC will forward the Policy Framework to the CBDA for their approval at their October 9th meeting. A meeting participant inquired if other subcommittees were providing Policy Frameworks to the BDPAC and CBDA. It appears that many have not, but they are encouraged to do so. Supporting documents forwarding the Policy Framework to the Authority were also provided to subcommittee members.

Grant Possibilities for Regional Planning

David Spath of DHS informed the group that to date, Proposition 50 is the only source of funding available through DHS. He requested time at the next DWS meeting (October 24) to give a formal presentation to the subcommittee. DHS would like to receive input from the subcommittee on the granting process, which he anticipates beginning in 2004. David reminded the group that this funding must be secured first before it can be designated for grants. David anticipates being able to move forward with proposals by the spring of 2004. He added that some of the grant monies are designated to fund Colorado River water quality projects, as well as projects in non-CBDA parts of the state of California, reminding the group of the state-wide focus of the proposition. David estimated approximately \$450 million would be available to address the five elements of the program including source protection. He reminded the group that much of the work at DHS regarding grants has been delayed due to fiscal concerns.

Sam Harader, CBDA, provided and explanation of the handouts provided for this discussion. The handouts included Water Code Section 79500-79509, relevant sections of Chapters 4, 5, 6, and 8 of the Water Code, and Attachment 8 (CALFED Drinking Water Quality Program Priorities and Criteria for Propositions 13 and 50).

Dave Spath mentioned the passage of AB 1747 requiring granting agencies to provide for public input into screening criteria formulation. He requested input from the DWS regarding the selection process, which will be discussed at the next DWS meeting. A subcommittee member agreed that additional criteria need to be developed. When asked if additional hiring might occur to assist DHS in this effort, David responded that at this point, Prop 50 funds for hiring staff is not available.

Michael Stanley-Jones commented that a draft of the criteria should be available in October. He stated there would be a period for public comment, in addition to two public hearings regarding the criteria development.

A subcommittee member stated that DHS must review proposals in regards to the regulatory framework of the state. The criteria must be designed to meet the state's water quality projects.

A representative of the Regional Water Quality Control Board addressed the group and stated current budgetary constraints (and a subsequent loss of qualified staff) might impact implementation of Prop 50 programs. He mentioned that Chapter 5 and Prop 40 provide funds to address non-point source pollution, while Chapter 8 allows for regional projects. A meeting participant asked if the definition of "regional" was under question. The response was no, the

definition is clear and in the verbiage of Chapter 8. He added that criteria will have to be developed and adopted by the State Board, but would probably be reviewed first by the California Watershed Council.

California Watershed Council Update

Martha Davis reported to the group via telephone on the recent establishment of the California Watershed Council (CWC). The CWC was formed by the Resources Agency and the California EPA to address the implementation of funds from Propositions 40 and 50. Martha reported to the group the results of California Watershed Council's inaugural meeting on August 28th at the Cal EPA Building in Sacramento. Martha was pleased to announce that the meeting was so wellattended, there was standing room only. The CWC will serve as a formal forum with an open membership whose focus is on implementation and tasks. Working Groups within the CWC were formed with the expectation that they will meet before the next CWC meeting, scheduled for February 2004. Near-term priorities for the CWC include recommendations from and between the Working Groups regarding grant criteria and guidelines. CWC is responsible for the public review aspect of the granting programs. Tasks of other Working Groups include: determining the role of the CWC, clarifying the relationship between Cal EPA and the Resources Agency, establishing public outreach, and improving accountability. Martha reported that Cal EPA and the Resources Agency plan to develop an interactive web-site so that the public can participate. Also on the site will be summaries from the meetings, updates, etc. The CWC is an advisory board to the agencies—they will make recommendations. Initial Work Group members were selected between the Cal EPA and the Resources Agency, however it is a totally open process with a great deal of stakeholder involvement expected. The CWC recognizes that the various agencies do not have a great deal of time or staff to consider issues such as the integration of watershed and water quality objectives, and will work as a resource and forum to those agencies as required. Martha encouraged DWS member participation in the CWC.

Napa Agreement Report

Tim Quinn, MWD, presented to the subcommittee information regarding the Napa Proposal. Tim provided the subcommittee members with a briefing document to supplement his Power Point presentation. He began his discussion stressing that the meetings held in Napa to address the CALFED ROD and CALFED implementation resulted in a Proposal, not an Agreement.

In sum, during the week of July 14th, 2003, representatives of the DWR, the US Bureau of Reclamation, and their respective contractor associations (the State Water Contractors and the San Luis Delta-Mendota Authority) met to develop a plan for improved integrated operations of the Central Valley Project (CVP) and the State Water Project (SWP). These discussions produced a proposition designed to better manage the state's two largest water projects and advance the implementation of the CALFED Bay-Delta Program. The opinion of meeting attendees is that the proposal provides a sound plan for management of both projects consistent with the balanced objectives of CALFED. The proposition is expected to moderately increase supplies for both projects. By better managing risk, it will allow higher allocations earlier in the year, increasing certainty for both CVP and SWP contractors. Most importantly, the proposal allows for the implementation of key CALFED programs, including increasing pumping capacity at the SWP Banks Pumping Plant to 8,500 cubic feet per second (Banks 8,500) and the continuation of the Environmental Water Account.

The Napa Statement of Objectives included:

- Protect Delta users
- Protect water quality
- Ensure consistency with the CALFED ROD
- Ensure consistency with fishery, operational, and ESA regulatory requirements.

Tim reported that the meetings were intense and very productive. On the first day, all participants agreed to work collaboratively in planning the coordination of the two projects. In addition to the support of Banks 8,500 cfs, two additional conveyance actions agreed to were: water could be conveyed through the SWP in support of CVP deliveries, and that an intertie between the two projects should be developed. More efficient and organized operation of the systems would increase water supply, including the notion that CVP will assume a shift in water quality obligations up to 75,000 af/year. Also, Phase 8 water would be shared (60% SWP, 40% CVP). Innovative storage proposals were suggested for Shasta Reservoir and San Luis Reservoir, which would result in increased water storage as well. Participants in the meetings agreed that implementation of the proposal would not impact water quality, and to commit to cooperating on the implementation of CALFED water quality actions. Regarding environmental issues, the proposal assures the implementation of the Environmental Water Account (EWA) past 2004 to 2007, and provides for a long-term EWA (beyond 2007) with adequate assets and a financial plan. Also, there is a multi-year, multi-species ESA assurances plan. Coordinated Operations Agreement adjustments were proposed, including a resolution of COA accounting issues concerning the EBMUD Freeport Project and the North Bay Aqueduct. Additionally, enhanced coordination and efficiency was agreed to with a joint CVP/SWP annual operation plan and an operations coordination team. The proposal is a long-term agreement, with a performance evaluation every five years. Additionally the proposal may be terminated after ten years upon a one-year notice, and it must be consistent with State and federal laws. Tim's presentation included a bar chart that showed the dramatic water supply benefits for both the CVP and SWP resulting from the Napa Proposal, Phase 8 supplies, and the South Delta improvement program.

Outstanding issues of the proposal included EWA assets and funding, Delta agricultural protection, and Delta water quality issues. The next steps of the proposal include:

- September 2003
 - --Refine Napa proposal based on outreach and comments
 - -- Draft long-term EWA package
- January 2004
 - --Final OCAP/biological assessment
 - --Final environmental documents on EWA and CVP/SWP intertie
- June 2004
 - --Final biological opinions on OCAP and South Delta
 - --Final agreement on long-term EWA
- August 2004
 - --Final South Delta Record of Decision

Tim finished his presentation by providing the group with contact information, and told the DWS that the proposal provides for many potential water quality improvements. They are working with Delta representatives to address those areas of concern, but that all those present at Napa felt the meetings were a great success that displayed a solidarity not seen before in the water community.

A subcommittee member inquired if more could be said about water quality in the Napa proposal. Tim encouraged the DWS to get involved and make suggestions. Co-chair Greg Gartrell suggested discussing that at an upcoming DWS meeting.

Eugenia Laychak asked when this proposal might be brought to the attention of the Authority. Tim responded that this is a CALFED package, and during the "next steps" stage of the proposal, focused outreach to the various participating agencies, especially CBDA, will occur.

A meeting participant asked if under typical pumping plans, is there concern about water quality at the intertie of the two projects? Tim responded that participants did not find water quality at the intertie to be of concern. He reported that meetings with CA Fish and Game and the environmental community have been occurring over the past month. When asked if there was a summary or report explaining the linkage with CALFED, Tim responded that he is preparing an address for a hearing which he could distribute to the group.

Nominal Group Technique (NGT) Workshop Follow-Up

This workshop, held in late July 2003, was aimed at organizing ideas regarding the future of the DWS, their policy framework, and most importantly, a strategic plan. Sam Harader addressed the subcommittee and explained that a consultant may be needed to assist with the creation of a strategic plan that would incorporate elements of the ELPH diagram, the DWQP work plan, strategies in the ROD and in the DWQP, regional profiles, Bulletin 160 and Water 2025 updates, and stakeholder comments. He reported that CBDA has given the DWS the option of providing a mid-point assessment of objectives in the ROD pertaining to Drinking Water Quality (originally required at the end of 2004 in the ROD). The point of the assessment would be to target the DWQ objectives of the ROD and the funding allocated to them. The mid-point assessment may also be included in this effort Sam suggested that the strategic plan should cover the next 3-4 years of the program. His original idea was to have separate workshops or interviews with various DWQ stakeholders, and then provide updates and information to the DWS at their monthly meetings. Alternatively, these workshops, which would address each aspect of the ELPH diagram, could occur during the monthly DWS meetings. Sam felt the basic strategy should be done in the next six months.

Reviewing the NGT Summary document, Greg Gartrell noted that the list of priorities was okay but not totally complete, and definitely should not be ranked in the order presented.

Karen Schwinn, EPA, commented that the source document for the strategic plan should be the NGT Summary Report, thus she requested feedback on the report to provide to the consultants contracted to do the work. She suggested that the consultants review the issues in the Summary Report at each DWS meeting to get feedback, if necessary.

Tom Zuckerman expressed his feeling that a great deal of the up-coming work might not need to be performed by consultants. He listed a few issues that need to be stressed. These issues are:

- 1) Importance of regional planning and strategic issues concerning the integration of regional planning
- 2) Need to create an index or comprehensive mechanism that will assess water quality and public health standards
- 3) Need to be able to fix the inconsistencies—don't compare apples with oranges.

Co-chair Marguerite Young stated that she felt the NGT Summary Report did not do an adequate job capturing the positive energy present at the workshop. She also commented that there are many other projects/priorities that were not included in the Report. She suggested the creation of break-out groups.

Tom Zuckerman interjected that a great deal of criticism regarding Bulletin 160 has been occurring, and he appealed to the subcommittee to become involved in that process.

A meeting participant expressed his concern that there were little resources available for a consultant to perform some of this work. He wondered why the subcommittee couldn't use their own expertise to address many of the complicated matters. He stressed the need to take a realistic approach. Co-chair Marguerite Young acknowledged the concerns expressed by this participant and by Tom Zuckerman.

Karen Schwinn stated that the definitions of ELPH and "safe" need to be determined.

A subcommittee member commented that whatever came out of the NGT meetings, the DWS still has to use its existing guidelines. He suggested prioritizing, while another subcommittee member recommended the idea of clustering similar issues in a final report or strategic plan.

Greg Gartrell stated that he liked the idea of having the three issue areas mentioned by Tom for break-out discussions. He suggested that at the next three meetings, presentations highlighting the three areas be given. Greg requested help in developing ideas for the presentations, but felt that regional water quality should be examined first.

Perchlorate Issues Panel

Following a request from Sam Harader, Robert Neufeld, Cucamonga County Water District, organized a series of presentations on Perchlorate contamination in drinking water. Perchlorate contamination in surface and groundwater is a growing pollution problem in drinking water sources around the state. It was the focus of the June 2003 issue of Western Water, a publication of the Water Education Foundation, copies of which were provided to subcommittee members at the meeting. Sam was able to establish a panel of several authorities on perchlorate, some of whom traveled from the Bay Area to participate in this meeting. Sam introduced the members of the panel, which included Dr. Robert Howd from the Office of Environmental Health Hazard Assessment (OEHHA) of Cal EPA, Renee Sharp of the Environmental Working Group in Oakland, and Alex MacDonald of Central Valley Regional Quality Control Board. Each panelist had a short presentation prepared for the subcommittee. Panel members provided response to questions throughout the presentations. What follows is a brief summary of the panelists' Power Point presentations.

Robert A. Howd, Ph. D. "Perchlorate Risk Assessment"

Dr. Howd began the discussion with a detailed presentation about the California process for regulating chemicals in drinking water, perchlorate risk assessment, perchlorate scientific issues, and the status of perchlorate standards. Dr. Howd explained that California water standards are defined by DHS and the Office of Environmental Health Hazard Assessment, and regulated under the California Safe Drinking Water Act. These standards include PHG (public health goal), MCL (maximum contaminant level), and Action Level ("advisory" level for otherwise non-regulated chemicals). MCLs must be set as close as feasible to the health goals under both statutes. The California MCL must be equal to or lower than the federal MCL. Regarding perchlorate risk assessment, a PHG was requested by DHS, and underway in OEHHA for about four years. An extensive literature review and analysis is occurring, as well as a lengthy internal and external scientific and public review process. Dr. Howd described how perchlorate affects the thyroid gland, inhibiting iodine uptake into the thyroid gland which results in

decreased thyroid function, and decreased growth and cell metabolism. It can potentially cause goiter in pregnant women and developmental effects including decreased IQ in offspring. High doses have resulted in thyroid tumors in rodents and aplastic anemia in humans. Dr. Howd described how the critical endpoint was chosen by OEHHA (the inhibition of thyroid uptake of iodine), and explained the critical study by Greer *et al.* (2002), which involved four groups of male and female volunteers dosed at 0.007, 0.02, 0.1, or 0.5 mg/kg-day via drinking water for 14 days. The radioactive iodine uptake by the thyroid was measured before and at the end of the exposure period. An evaluation of the iodine uptake inhibition in the study showed a point of departure of 5% decrease of the mean radioactive iodine uptake—the estimated dose associated with this point is 0.0068 mg/kg-day, or an NOAEL of 0.007 mg/kg-day.

The critical endpoints chosen by the US EPA were from studies evaluating multiple low-dose effects in rats. These studies showed changes in rat brain development, behavioral changes, immunological effects, and resulted in a NOAEL of 0.01 mg/kg-day, or an RfD of 0.0003 mg/kg-day. Dr. Howd explained the reasons why they had not selected changes in serum T4 as the endpoint, mainly because there is a variable threshold for T4 depression, affected by many factors, and that it does not consider the effects of NIS inhibition in other extra-thyroidal tissues (e.g., mammary glands).

Scientific issues concerning perchlorate include:

- o Use of human versus animal data, with corresponding UFs (30 or 300)
- o Identification of iodine uptake inhibition as the critical effect
- o Evidence for or against sensitive populations
- o Adequacy of UF, considering data limitations.

Regarding exposure calculations, drinking water is considered the primary exposure route. Uptake into plants from irrigation water is an important consideration. Perchlorate contribution from food is not yet calculable, but appears to be showing up in some food crops such as lettuce. Finally, "relative source contribution" is not clear. Thus, the concern remains that at environmental concentrations, perchlorate could cause:

- Goiter in pregnant women
- Adverse neurological development in fetuses and infants
- Reduction if IQ in offspring
- Additional stress on patients suffering from hypothyroidism.

Unfortunately, no studies have been conducted to date that address these concerns.

The status of perchlorate standards at the federal level are that the US EPA has proposed an RfD of 0.0003 mg/kg-day and a DWEL of 1 ppb in 2002. The RfD is under review by the National Academy of Sciences, with the finalization of the RfD expected in 2-3 years. An MCL is expected around 2006-2008. The status of perchlorate standards at the state level are that the DHS has set an Action Level of 4 ppb in 2002. OEHHA has proposed a PHG in the range of 2-6 ppb in 2002, now under review. PHG finalization is expected in Fall 2003, and a California MCL is expected by January 1, 2004.

Meanwhile, crop analyses are continuing, more perchlorate-contaminated wells are being discovered, and current bills in the US Senate (Boxer) and Assembly (Capps) direct the US EPA to finalize an MCL in 2004. Dr. Howd concluded his presentation with a slide listing OEHHA contacts and useful websites.

Renee Sharp "Perchlorate: an explosive problem"

Renee Sharp addressed the group next with a slide show about the basics of perchlorate and the concerns many environmental advocate groups have about the problem. Perchlorate is highly oxidized chlorine: CIO₄. It is sold typically as ammonium or potassium perchlorate salts that disassociate in water. It is highly soluble, mobile, and stable. It is also very difficult to get rid of. Ninety percent of perchlorate is used to make solid rocket fuel. It is also used in flares, explosives, fireworks, matches, and is a natural contaminant of some fertilizers from Chile. Perchlorate was also once used at high doses to treat hyperthyroidism until 7 patients died in the 1960s of aplastic anemia. Renee provided a short history of perchlorate contamination in California, the problems of which weren't officially addressed until the early 1990s. Widespread testing started in 1997 when better detection methods were developed. However, still less than half of the public drinking water sources in California have been tested for perchlorate.

Renee displayed a chart detailing the hundreds of drinking water sources which have been identified in various counties of California, the most of which were detected in Los Angeles, San Bernardino, and Riverside counties. A graph displayed that more contaminated sources are being discovered every month.

New data from Texas Tech studies have shown that perchlorate has been discovered to be concentrated by many food and feed crops, including alfalfa, grass, wheat heads, soybeans, and strawberries. The Environmental Working Group (EWG) conducted studies using samples of lettuce, which found an average perchlorate level of 72 ppb in the four samples used. High perchlorate concentrations were detected in conventional adult butter lettuce and radicchio, and in mixed organic baby greens. Perchlorate has been detected in cow's milk, in a study using four brands that were bottled in Texas, and two brands that were bottled elsewhere. Perchlorate has also recently been detected in a sample of human breast milk taken from a woman living near Lubbock, TX. The conclusion was made that given how perchlorate acts on a cellular level, finding the chemical in cow and human milk is not that surprising.

Renee described how perchlorate acts on the body and whom is most at risk (people who are hypothyroid, pregnant women, children, fetuses and infants). She shared information from some key studies that were conducted regarding perchlorate and infant thyroid hormone levels. Renee discussed how there are still no standards or regulations, and sited the same proposed numbers that Dr. Howd used in his presentation. She noted that all standards have been and continue to be highly contentious. Perchlorate manufacturers, industrial users and the Department of Defense have been relentlessly trying to influence these standards.

Regarding safe drinking water levels of perchlorate, California has a proposed "Public Health Goal" range of between 2 and 6 ppb. The lower one incorporates a safety (uncertainty) factor of only 3 when considering infant body weight and only 10 when considering adult body weight. In the opinion of the Environmental Working Group, this margin of safety is far too low to be protective. The PHG also assumes that drinking water contributes 80% of perchlorate exposure. EWG feels this assumption is off base: the more research is done on the levels of perchlorate in food, the more it looks like food is a major source of exposure. Renee noted that the US EPA has a proposed "reference dose" which is equivalent to 1 ppb, which doesn't take into consideration any other

sources of perchlorate besides drinking water. This is currently under review by the National Academy of Sciences.

Several Native American tribes, who are able to set their own standards, are considering levels < 1 for drinking water and <2 for irrigation water.

In conclusion, based on current scientific studies, using infant rather than adult body weight and drinking water consumption figures and a more appropriate safety factor, EWG has recommended that a perchlorate drinking water standard should be no higher than 0.1 ppb. Renee ended her presentation with reminders of the enduring problems of perchlorate contamination and a list of resources for meeting participants.

As a comment, Dr. Howd stated that while he couldn't provide a specific recommended standard, he agreed with EWG that the perchlorate drinking water standard which has been proposed is too high and should be re-examined.

Alexander Macdonald "Groundwater Contamination and Remediation Near Aerojet"

Alex Macdonald of the CVRWQCB gave a presentation next on the effects of perchlorate in groundwater contamination at a local Aerojet site near the landfills by Mather Base. There is a great deal of military waste near this area of Rancho Cordova. Buffalo Creek flows directly through the site, and the American River is to the north of the site where new groundwater plumes cross approximately 80-100 feet beneath the river. In addition to other contaminants of concern, perchlorate is a major problem at this site. The RWQCB sued the company several times in the late 1970s in an effort to involve them in cleaning up the mess. They have been ordered by the US EPA to start fixing the problem and to provide progress reports to the CVRWQCB, with cleanup values of 4 ppb for perchlorate and 0.002 ppb for NDMA. Water supply wells in the area were shut down. They are establishing operable units.

At the McDonnell-Douglas IRCTS fireworks and ammunition site nearby, there have been groundwater contamination problems and growing plumes. Morrison Creek runs through that site. They are trying to stop the migration of new plumes, so they've applied for permits to treat. Treatment methods include biological reduction and resin-bed absorption, both of which have been approved by the DHS for remediation. In situ, biological reduction works well.

They have lost 13 water supply wells due to concentrations and action levels. The interim response actions include the construction of new wells and pipelines/storage facilities. Contingency plans for interim water supply replacement are being developed, and they are evaluating the long-term replacement measures. To replace the water supplies, there have been bi-weekly meetings with RWQCB staff, DHS staff, water purveyors, Aerojet and Boeing focusing on short-term and near-term water supply replacement. Alex explained that there have been many water supply replacement hurdles they have faced, including lawsuits, tolling agreements, and the fact that the American River is a fully-appropriated stream and Wild & Scenic River. The groundwater basin is in overdraft, and there are competing interests for water and water rights. Additionally, the Bureau of Reclamation is showing reluctance for use of the Canal and the timing for development of agreements and access is limited. The directuse of treated water is not fully accepted, and the reliable quantization level for NDMA is at low concentrations.

Replacement water supplies include new supply wells, surface water supplies, and the use of wells in the Cal-Am System. These were described in detail and shown on maps of the area. Alex concluded his presentation with a review of the federal and state perchlorate standards development and recent health risk studies reported by the previous speakers.

Robert Neufeld "Perchlorate in Southern California"

As reported earlier, Bob Neufeld has recently encountered problems associated with perchlorate contamination in Southern California. He commented that his curiosity with the issue was sparked by a July lawsuit where the impacts of perchlorate were discussed. The problem has affected several water utilities and providers, including Fontana Water, West Valley Water District, and others in the Culton-Rialto Basin. There have been twenty infected wells, two of which display perchlorate levels at very high amounts. The potential sources of perchlorate in this area include local corporations and the Department of Defense. The plumes have co-mingled so it is very hard to determine the actual sources of them. The Department of Defense has agreed to sign a letter of intent or MOU that arranges for them to provide resources for the clean-up, but not admit any wrongdoing. The two majority impacted agencies are the West Valley Water District and Fontana Water. Bob said some agencies have contributed to funding the clean-up. The cities of Colton and Rialto, and the West San Bernardino County Water District, have applied for and received Prop 50 grant money to address the clean-up problem. Bob concluded his presentation with the comment that perchlorate contamination is a very serious problem that requires a great deal of money to remedy. He thanked the panelists for coming and giving such detailed presentations, and opened it up for public comment.

Public Comment

There was a question about the reported levels of perchlorate in the Colorado River. It was suggested that the numbers Renee Sharp reported were exaggerated and that the level of contamination in the River is not that high. Renee stated she found that the data were generally accepted in the scientific community.

It was suggested that money might be available through the Cleanup and Abatement Fund to mitigate Perchlorate contamination, and that the State Board might pay if they believed they would get repaid.

One participant stated that perchlorate contamination is not just a local problem, but something that is happening all over the country and needs to be aggressively addressed.

It was reported that a panel or review of the perchlorate concern will likely occur in late October by the US EPA. Dr. Howd announced that there will be five public meetings across the state about the issue, with one most likely to take place in Sacramento.

Review Action Items

Greg Gartrell reviewed the action items, which mainly pertained to the preparation of next month's agenda and meeting. It was noted that a Work Group was being formed to brainstorm ideas for the end-of-the-year assessment and performance measures. There will be a facilitated workshop on the morning of October 22nd for several hours where participants will use the ELPH chart and other DWQP concepts to help prioritize what should be accomplished by the DWS.

Action Item: Sam Harader will distribute an email regarding the meeting on the morning of October 22^{nd} ASAP.

Next Meeting

October 24, 2003. In Sacramento at the CBDA offices at 9 a.m.

Agenda for October 24, 2003

NGT workshop summary and follow-up DHS Grant Making Prop 50 presentation Update on 2003 Assessment Work Group Central Valley Drinking Water Policy Update CBDA Meeting Update Plan for DWQP funds at ABAG Regional ELPH plans Strategic Planning

Partial List of Attendees for the DWS Meeting 09-26-03

The following Subcommittee members attended the meeting:

- 1. Greg Gartrell
- 2. Martha Guzman
- 3. Robert Neufeld
- 4. Pankaj Parekh
- 5. Tim Quinn
- 6. Michael Stanley-Jones
- 7. David Tompkins
- 8. Kevin Wattier
- 9. Marguerite Young
- 10. Tom Zuckerman

Other meeting participants:

- 11. Elaine Archibald
- 12. Elizabeth Borowiec
- 13. Bill Crooks
- 14. Alisha Deen
- 15. Dave Forkel
- 16. Mark Gowdy
- 17. Paul Gilbert-Snyder
- 18. Sam Harader
- 19. John Hewitt
- 20. Lisa Holm
- 21. Syed Khasimuddin
- 22. Eugenia Laychak
- 23. Gene Lee
- 24. G. Fred Lee
- 25. Julie Maclay
- 26. Steve Macaulay
- 27. Lee Mao
- 28. Michelle McGraw
- 29. Dan Otis
- 30. Wayne Purson
- 31. Karen Schwinn
- 32. Larry Smith
- 33. Lynda Smith
- 34. Phil Wendt